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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/540,222	05/16/2006	David James Howell	4502-1075	5283
466 7590 02/23/2007 YOUNG & THOMPSON 745 SOUTH 23RD STREET 2ND FLOOR ARLINGTON, VA 22202			EXAMINER BAISA, JOSELITO SASIS	
			ART UNIT	PAPER NUMBER
			2832	
SHORTENED STATUTORY PERIOD OF RESPONSE		MAIL DATE	DELIVERY MODE	
3 MONTHS		02/23/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary	Application No. 10/540,222	Applicant(s) HOWELL ET AL.	
	Examiner Joselito Baisa	Art Unit 2832	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 1 December 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-11 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 20 June 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Yamada et al. [5986377] in view of Neal et al. [6892439].

Regarding claim 8, Yamada discloses a set of wound bobbins 17 initially wound as a rectilinear array and formed into a circular array, the windings 18 of two or more bobbins in each phase [Col. 6, Lines 8-25, Figure 1].

Yamada disclose the instant claimed invention discussed above except for the windings being formed from a continuous wire or a continuous set of parallel wires.

Neal discloses windings formed from a continuous wire 15 or a continuous set of parallel wires [Col. 5, Lines 22-28, Figure 2].

It would have been obvious to one having ordinary skill in the art at the time of the invention to form the windings from a continuous wire as taught by Neal to the rectilinear array of bobbins by Yamada.

The motivation would have been to achieve a higher packing density of wire [Col. 5, Lines 28-30, Figure 2].

With respect to claims 1-5, the claims are method counterpart of structure of claim 8 and method steps therefore are inherent for manufacturing a toroidally wound electrodynamic machine.

Regarding claim 9, Yamada discloses the bobbins 17 provide free space between the bobbins 17 sufficient to allow forming them into a circular array while still providing contact between the bobbins 17 on the side of the bobbin [Col. 6, Lines 8-25, Figure 1].

Yamada disclose the instant claimed invention discussed above except for the winding method provide free space between the bobbins sufficient to allow forming them into a circular array while still providing contact between the bobbins on the side of the bobbin.

Neal discloses the winding method provide free space between the bobbins sufficient to allow forming them into a circular array while still providing contact between the bobbins on the side of the bobbin [Col. 5, Lines 22-28, Figure 2].

It would have been obvious to one having ordinary skill in the art at the time of the invention to use the winding method as taught by Neal to the structure of Yamada .

The motivation would have been to achieve the right packing density [Col. 5, Lines 28-30, Figure 2].

With respect to claims 6 and 7, the claims are method counterpart of structure of claim 9 and method steps therefore are inherent for manufacturing a toroidally wound electrodynamic machine.

Regarding claim 10, Yamada discloses the bobbins 17 are tapered on the inner cheeks to facilitate forming into a circular array [Col. 8, Lines 43-44, Figure 2].

Regarding claim 11, Yamada discloses an electrodynamic machine when fitted with a winding described above [Col. 5, Lines 45-50].

Response to Argument

Applicant's arguments with respect to claims 1-11 have been considered but are moot in view of the new ground(s) of rejection. Yamada in view of Neal disclose a set of wound bobbins initially wound as a rectilinear array and formed into a circular array and the windings of two or more bobbins in each phase being formed from a continuous wire.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joselito Baisa whose telephone number is (571) 272-7132. The examiner can normally be reached on M-F 5:30 am to 2:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Elvin Enad can be reached on (571) 272-1990. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2832

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Joselito Baisa
Examiner
Art Unit 2832



ANH MAI
PRIMARY EXAMINER

jsb